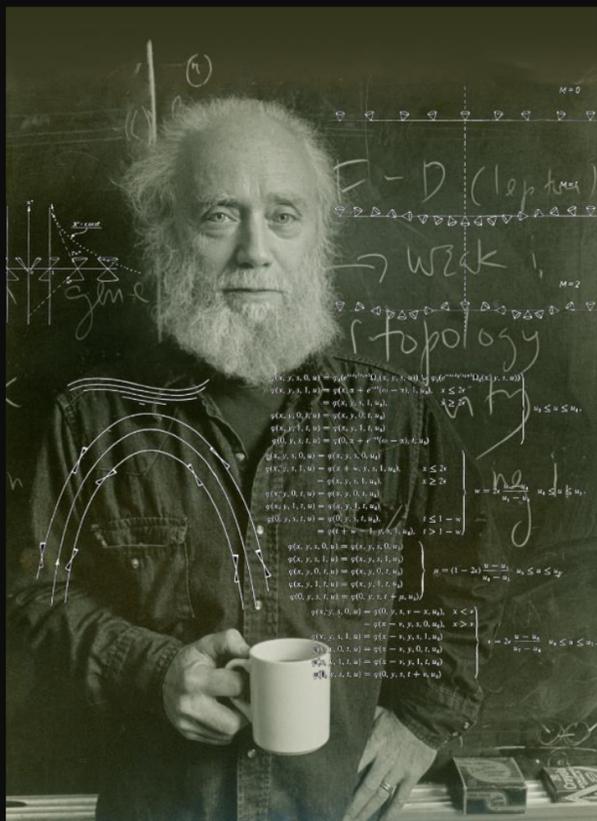


Bold Ideas in Physics: Celebrating David Ritz Finkelstein (1929-2016)



“A brilliant scientist with a passion for long shots,” whose work was “of great significance, extraordinary penetration, and 10 years ahead of everyone else”

Sidney Coleman

School of Physics Emeritus Professor David Ritz Finkelstein (1929-2016) was the first to show, at age 29, that anything falling inside a black hole cannot escape. The work helped bring general relativity into mainstream physics, encouraging today’s vibrant research on black holes.

Among the first to bring topology into quantum physics, Finkelstein discovered phenomena called “kinks” and solitons and formulated a theory of

electroweak unification. His enduring, bold passion was developing a universal physical theory consistent with both quantum theory and gravity theory.

To celebrate Finkelstein’s life and work, the School of Physics has organized an exhibit and a Frontiers in Science lecture. **The activities are made possible in part by a generous contribution from Dr. Ramon and Mrs. Jody Franco.**



Frontiers in Science Lecture **The Square Kilometre Array: Big Telescope, Big Science, Big Data** **By Russ Taylor**

The Square Kilometre Array (SKA) is a next-generation global radio telescope. One of the largest scientific projects ever undertaken, the SKA aims to answer some big questions of our time: What is dark matter? When and how did the first stars and galaxies form?

The SKA radio telescope will consist of thousands of radio antennas spread over thousands of square kilometers in Southern Africa. It will create 3D maps of the universe 10,000 times faster than any imaging radio telescope array ever built.

Russ Taylor has played a leading role in the SKA

Project since its inception, as co-author of the first science case for the project, founding executive secretary of the International SKA Steering Committee, and more.

Exhibit **Bold Ideas in Physics: Celebrating David Ritz Finkelstein**

The exhibition highlights the life and career contributions of Finkelstein and connects his scientific insights to recent work and discoveries involving Georgia Tech research scientists. Finkelstein’s life-long engagement in scientific inquiry, as well as the inspiration he took from aspects of culture not directly associated with his scientific pursuits, offer a model and example to students and future generations of scientists.

**Jan. 23, 2016, 6-7 PM • Clough Undergraduate Learning Commons
Room 152 and Ground-Floor Atrium • 266 4th St. NW, Atlanta, GA 30313**